Name:	Jeffrey Eldrige

Research Answers

a) Personal Luxury Car

b) Electric, LiDAR, built-in Fridge, aluminum inserts, keyless entry, larger engine, backup cameras, blind spot monitors, rear cross traffic alert, and smart cruise control.

c) 400

d) 3,000

e) 25,000

Do your work for part e here: 25000

Vehicle Chosen Answers

a) 2022 XPeng Pe5 Electric Vehicle, with LiDAR

b) Electric, LiDAR, built-in Fridge, keyless entry, and smart cruise control

c) $25,000

Picture of ad for chosen vehicle (that shows the price) should go below here!

Purchase Price	$25,000
Down Payment	$3,000
Loan Amount	$22,000

APR =	2.65%
n =	12
Y =	5
P =	$22,000
PMT =	$391.90

Payment Number	Monthly Payment	Interest Paid	Principal Paid	Loan Balance
0				$22,000
1	$391.90	$48.58	$343.32	$21,657
2	$391.90	$47.83	$344.07	$21,313
3	$391.90	$47.07	$344.83	$20,968
4	$391.90	$46.30	$345.60	$20,622
5	$391.90	$45.54	$346.36	$20,276
6	$391.90	$44.78	$347.12	$19,929
7	$391.90	$44.01	$347.89	$19,581
8	$391.90	$43.24	$348.66	$19,232
9	$391.90	$42.47	$349.43	$18,883
10	$391.90	$41.70	$350.20	$18,533
11	$391.90	$40.93	$350.97	$18,182
12	$391.90	$40.15	$351.75	$17,830
13	$391.90	$39.37	$352.53	$17,477
14	$391.90	$38.60	$353.30	$17,124
15	$391.90	$37.82	$354.08	$16,770
16	$391.90	$37.03	$354.87	$16,415
17	$391.90	$36.25	$355.65	$16,059
18	$391.90	$35.46	$356.44	$15,703
19	$391.90	$34.68	$357.22	$15,346
20	$391.90	$33.89	$358.01	$14,988
21	$391.90	$33.10	$358.80	$14,629
22	$391.90	$32.31	$359.59	$14,269
23	$391.90	$31.51	$360.39	$13,909
24	$391.90	$30.72	$361.18	$13,548
25	$391.90	$29.92	$361.98	$13,186
26	$391.90	$29.12	$362.78	$12,823
27	$391.90	$28.32	$363.58	$12,459
28	$391.90	$27.51	$364.39	$12,095
29	$391.90	$26.71	$365.19	$11,730
30	$391.90	$25.90	$366.00	$11,364
31	$391.90	$25.10	$366.80	$10,997
32	$391.90	$24.29	$367.61	$10,629
33	$391.90	$23.47	$368.43	$10,261
34	$391.90	$22.66	$369.24	$9,892
35	$391.90	$21.84	$370.06	$9,522
36	$391.90	$21.03	$370.87	$9,151
37	$391.90	$20.21	$371.69	$8,779
38	$391.90	$19.39	$372.51	$8,407
39	$391.90	$18.56	$373.34	$8,033
40	$391.90	$17.74	$374.16	$7,659
41	$391.90	$16.91	$374.99	$7,284
42	$391.90	$16.09	$375.81	$6,908
43	$391.90	$15.26	$376.64	$6,532
44	$391.90	$14.42	$377.48	$6,154
45	$391.90	$13.59	$378.31	$5,776
46	$391.90	$12.76	$379.14	$5,397
47	$391.90	$11.92	$379.98	$5,017
48	$391.90	$11.08	$380.82	$4,636
49	$391.90	$10.24	$381.66	$4,254
50	$391.90	$9.39	$382.51	$3,872
51	$391.90	$8.55	$383.35	$3,488
52	$391.90	$7.70	$384.20	$3,104
53	$391.90	$6.86	$385.04	$2,719
54	$391.90	$6.00	$385.90	$2,333
55	$391.90	$5.15	$386.75	$1,947
56	$391.90	$4.30	$387.60	$1,559
57	$391.90	$3.44	$388.46	$1,170
58	$391.90	$2.58	$389.32	$781
59	$391.90	$1.72	$390.18	$391
60	$391.90	$0.86	$391.04	($0)

INTEREST
$1,513.92

TOTAL
$23,514.00

6-year Loan Option Directions

You will generally have a few different options for financing when you purchase a car. For the sake of this lab, we will only consider 2 options.

Option 2: a 6-year loan with an APR of 3.15%

Purchase Price	25,000
Down Payment	3,000
Loan Amount	22,000

APR =	3.15%
n =	12
Y =	6
P =	22,000
PMT =	$335.74

Payment Number	Monthly Payment	Interest Paid	Principal Paid	Loan Balance
0				22,000.00
1	335.74	$57.75	277.99	21,722.01
2	335.74	$57.02	278.72	21,443.29
3	335.74	$56.29	279.45	21,163.84
4	335.74	$55.56	280.18	20,883.65
5	335.74	$54.82	280.92	20,602.73
6	335.74	$54.08	281.66	20,321.08
7	335.74	$53.34	282.40	20,038.68
8	335.74	$52.60	283.14	19,755.54
9	335.74	$51.86	283.88	19,471.66
10	335.74	$51.11	284.63	19,187.03
11	335.74	$50.37	285.37	18,901.66
12	335.74	$49.62	286.12	18,615.53
13	335.74	$48.87	286.87	18,328.66
14	335.74	$48.11	287.63	18,041.03
15	335.74	$47.36	288.38	17,752.65
16	335.74	$46.60	289.14	17,463.51
17	335.74	$45.84	289.90	17,173.61
18	335.74	$45.08	290.66	16,882.95
19	335.74	$44.32	291.42	16,591.53
20	335.74	$43.55	292.19	16,299.34
21	335.74	$42.79	292.95	16,006.39
22	335.74	$42.02	293.72	15,712.67
23	335.74	$41.25	294.49	15,418.17
24	335.74	$40.47	295.27	15,122.91
25	335.74	$39.70	296.04	14,826.86
26	335.74	$38.92	296.82	14,530.04
27	335.74	$38.14	297.60	14,232.44
28	335.74	$37.36	298.38	13,934.06
29	335.74	$36.58	299.16	13,634.90

30	335.74	$35.79	299.95	13,334.95
31	335.74	$35.00	300.74	13,034.22
32	335.74	$34.21	301.53	12,732.69
33	335.74	$33.42	302.32	12,430.38
34	335.74	$32.63	303.11	12,127.27
35	335.74	$31.83	303.91	11,823.36
36	335.74	$31.04	304.70	11,518.66
37	335.74	$30.24	305.50	11,213.15
38	335.74	$29.43	306.31	10,906.85
39	335.74	$28.63	307.11	10,599.74
40	335.74	$27.82	307.92	10,291.82
41	335.74	$27.02	308.72	9,983.10
42	335.74	$26.21	309.53	9,673.56
43	335.74	$25.39	310.35	9,363.22
44	335.74	$24.58	311.16	9,052.05
45	335.74	$23.76	311.98	8,740.08
46	335.74	$22.94	312.80	8,427.28
47	335.74	$22.12	313.62	8,113.66
48	335.74	$21.30	314.44	7,799.22
49	335.74	$20.47	315.27	7,483.95
50	335.74	$19.65	316.09	7,167.86
51	335.74	$18.82	316.92	6,850.93
52	335.74	$17.98	317.76	6,533.18
53	335.74	$17.15	318.59	6,214.59
54	335.74	$16.31	319.43	5,895.16
55	335.74	$15.47	320.27	5,574.89
56	335.74	$14.63	321.11	5,253.79
57	335.74	$13.79	321.95	4,931.84
58	335.74	$12.95	322.79	4,609.05
59	335.74	$12.10	323.64	4,285.40
60	335.74	$11.25	324.49	3,960.91
61	335.74	$10.40	325.34	3,635.57
62	335.74	$9.54	326.20	3,309.37
63	335.74	$8.69	327.05	2,982.32
64	335.74	$7.83	327.91	2,654.41
65	335.74	$6.97	328.77	2,325.64
66	335.74	$6.10	329.64	1,996.00
67	335.74	$5.24	330.50	1,665.50
68	335.74	$4.37	331.37	1,334.13
69	335.74	$3.50	332.24	1,001.90

70	335.74	$2.63	333.11	668.79
71	335.74	$1.76	333.98	334.80
72	335.68	$0.88	334.80	0.00

TOTAL Interest
$2,173.22

TOTAL
$24,173.22

Final Questions

Now that you have completed the amortization tables for both loan options, the questions below will help you compare the options and decide which one is best for you.

1) Which option has the lower total cost?

2) How much less does it cost than the other option?

3) Which option has the lower monthly payment?

4) How much lower is this monthly payment than the other option?

5) How much interest would you pay on each of the loans?

6) Which option do you think makes the most sense for you, and why?

Final Answers

1) Obviously, the first option will have a lower cost. The only benefit to the 6-year option is it's (slightly) lower monthly payment.

2) The total cost difference between the two options is $659.22.

3) As previously mentioned, the 6-year option has a lower monthly payment.

4) As previously mentioned, the monthly payment for the 6-year option is only slightly lower: $56.22.

5) 5-years: $1,513.92
6-years: $2,173.22

6) The 5-year option makes the most sense. Time itself is not necessarily at issue here. However, if I've decided a recurring payment of a particular amount works for me and coordinates effectively with my (expected) budget, and a lender's stipulated payment schedules are both below the "limit" aforementioned--well, obviously I'll select the schedule that is less expensive , overall. The 5-year plan involves a slightly-higher payment (still below $400) but the schedule omits more than 1/4 of the total paid to interest in the 6-year plan.

Further, it makes little sense to draw repayment out for another year, especially considering neither plan would signifigantly stress my indicated budget.

Do the work for question 2 here: 691.22

Do the work for question 4 here: 56.22